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15	ttt gac cga cag acc ctt gcc cgc ccc cca cac agc cca tgg cga ttg Phe Asp Arg Gln Thr Leu Ala Arg Pro Pro His Ser Pro Trp Arg Leu 405 410 415	1248
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40	Asn Arg Glu Gly Leu Arg Val Ala Val Ile Val Asn Asp Met Ser Glu 35 40 45	
	Val Asn Ile Asp Ala Glu Glu Val Gln Arg Asp Val Ala Leu His Arg 50 55 60	
45	Gly Arg Asp Glu Leu Ile Glu Met Ser Asn Gly Cys Ile Cys Cys Thr 65 70 75 80	
50	Leu Arg Ala Asp Leu Leu Glu Gln Ile Ser Met Leu Ala Arg Gln Gln 85 90 95	
55	Arg Phe Asp Tyr Leu Leu Ile Glu Ser Thr Gly Ile Ser Glu Pro Met 100 105 110	
60	Pro Val Ala Glu Thr Phe Ala Phe Leu Asp Ala Asp Gly Phe Ser Leu 115 120 125	

Ser Glu Leu Ala Arg Leu Asp Thr Leu Val Thr Val Val Asp Gly Ser
130 135 140

5 Arg Phe Gln Glu Leu Leu Glu Ser Pro His Thr Val Asp Gln Asp Asp
145 150 155 160

10 Ala Thr Pro Asp Ala Pro Lys Arg His Leu Ala Asp Leu Leu Ile Glu
165 170 175

15 Gln Val Glu Tyr Ala Asn Val Ile Leu Val Asn Lys Leu Asp Leu Ile
180 185 190

Asp Ala Ala Gln Tyr Gln Ala Val Gln Ala Ile Leu Thr Gly Leu Asn
195 200 205

20 Pro Thr Ala Arg Ile Met Pro Met Ala His Gly Asn Ile Pro Ser Ala
210 215 220

25 Ser Leu Leu Gly Thr His Leu Phe Asp Leu Pro Ser Leu Ala Ala Ser
225 230 235 240

30 Pro Gly Trp Met Arg Lys Met Glu Ala Ala Asp Ala Pro Ala Ser Glu
245 250 255

35 Ser Asp Thr Tyr Gly Val Thr Ser Trp Val Tyr Arg Glu Arg Ala Pro
260 265 270

Phe His Pro Gln Arg Leu Leu Asp Phe Leu Gln Gln Pro Trp Cys Asn
275 280 285

40 Gly Arg Leu Leu Arg Ser Lys Gly Tyr Phe Trp Leu Ala Ser Arg His
290 295 300

45 Leu Glu Thr Gly Leu Leu Val Gln Ser Gly Lys Arg Phe Gln Trp Asp
305 310 315 320

50 Tyr Val Gly Arg Trp Trp Asn Phe Ile Glu Pro Ser Gln Trp Pro Arg
325 330 335

55 Asp Glu Tyr Arg Leu Gln Gly Ile Arg Ala Lys Trp Asp Ser Val Val
340 345 350

Gly Asp Cys Arg Gln Glu Leu Val Phe Ile Gly Gln Gly Leu Asp Thr
355 360 365

60 Asp Ala Leu Gln Arg Glu Leu Asp His Cys Leu Leu Ser Ala Gln Glu
370 375 380

Ile Ala Ala Gly Pro Leu Ala Trp Gln Ala Leu Pro Gly Ala Thr Ala
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40 gtg ctc aag cgc aaa gac ctc atc ccc gag ggc tac atc gaa cag ctc 96
 Val Leu Lys Arg Lys Asp Leu Ile Pro Glu Gly Tyr Ile Glu Gln Leu
 20 25 30

45 acc cag ctg atg gaa cac ggc tgg agc ccg gaa aac ggc gcg cgc atc 144
 Thr Gln Leu Met Glu His Gly Trp Ser Pro Glu Asn Gly Ala Arg Ile
 35 40 45

gtc gcc aag gcc tgg gtc gat ccg cag ttt cgc gag ctg ctg ctc aag
 Val Ala Lys Ala Trp Val Asp Pro Gln Phe Arg Glu Leu Leu Leu Lys
 50 55 60

gac ggt acg gcc gcc tgc gcc cag ttc ggc ttc acc ggc cca caa ggc	240
Asp Gly Thr Ala Ala Cys Ala Gln Phe Gly Phe Thr Gly Pro Gln Gly	
65 70 75 80	

55 gaa tac atc gtc gcc ctg gaa gac acc ccg cag ttg aaa aac gtg atc 288
 Glu Tyr Ile Val Ala Leu Glu Asp Thr Pro Gln Leu Lys Asn Val Ile
 85 90 95

60 gtc tgt agc ctg tgc tcc tgc acg aac tgg ccg gtg ctc ggc ctc cca
 Val Cys Ser Leu Cys Ser Cys Thr Asn Trp Pro Val Leu Gly Leu Pro
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	cct gag tgg tac aag ggc ttc gag ttc cgt gcg cgg ttg gtc cg	gag	384	
	Pro Glu Trp Tyr Lys Gly Phe Glu Phe Arg Ala Arg Leu Val Arg Glu			
	115	120	125	
5	ggg cgc acg gta ttg cgc gag ctg ggc acc gag ttg ccc ggc gac atg		432	
	Gly Arg Thr Val Leu Arg Glu Leu Gly Thr Glu Leu Pro Gly Asp Met			
	130	135	140	
10	gtg gtc aag gtc tgg gac acc agc gct gaa agc cgc tac ctg gtg ctg		480	
	Val Val Lys Val Trp Asp Thr Ser Ala Glu Ser Arg Tyr Leu Val Leu			
	145	150	155	160
15	ccg caa cga cca gcg ggc tca gag cat atg agc gaa gag cag ttg cgg		528	
	Pro Gln Arg Pro Ala Gly Ser Glu His Met Ser Glu Glu Gln Leu Arg			
	165	170	175	
	caa ctg gtc acc aag gac gtc ctg atc ggc gtc gcc ctg ccc cgc gtt		576	
	Gln Leu Val Thr Lys Asp Val Leu Ile Gly Val Ala Leu Pro Arg Val			
20	180	185	190	
	ggc tga gcaaggccgc ccaacccat tcaacttccg gagtgttcaa t atg gat ggc		632	
	Gly	Met Asp Gly		
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25	ttt cac gat ctc ggc ggt ttc cag ggc ttt ggc aaa gtg ccc cac cgc		680	
	Phe His Asp Leu Gly Gly Phe Gln Gly Phe Gly Lys Val Pro His Arg			
	200	205	210	
30	atc aac agc ctg agc tac aag cag gtc ttc aag cag gac tgg gaa cac		728	
	Ile Asn Ser Leu Ser Tyr Lys Gln Val Phe Lys Gln Asp Trp Glu His			
	215	220	225	
35	ctg gcc tac agc ctg atg ttc atc ggc gtc gac cac ctg aac aag ttc		776	
	Leu Ala Tyr Ser Leu Met Phe Ile Gly Val Asp His Leu Asn Lys Phe			
	230	235	240	
	agc gtc gac gaa ata cgt cat gcc gtc gaa cgc att gac gtg cgc cag		824	
	Ser Val Asp Glu Ile Arg His Ala Val Glu Arg Ile Asp Val Arg Gln			
	245	250	255	260
40	cac gtc ggc acc gaa tac tac gaa cgt tat gtg atc gcc act gcc acg		872	
	His Val Gly Thr Glu Tyr Tyr Glu Arg Tyr Val Ile Ala Thr Ala Thr			
	265	270	275	
45	ctg ctg gtc gaa aca ggc gtc atc acc cag gcc gaa ctg gat gaa gca		920	
	Leu Leu Val Glu Thr Gly Val Ile Thr Gln Ala Glu Leu Asp Glu Ala			
	280	285	290	
50	ctc ggc tcg cac ttc aag ctg gcc aac ccc gcc cat gcg caa ggg cgt		968	
	Leu Gly Ser His Phe Lys Leu Ala Asn Pro Ala His Ala Gln Gly Arg			
	295	300	305	
55	gct gca att atc ggg cga gcg cct ttt gaa gtg ggc gat cgg gtc atc		1016	
	Ala Ala Ile Ile Gly Arg Ala Pro Phe Glu Val Gly Asp Arg Val Ile			
	310	315	320	
	gta cgc gat gaa tac gtg gcc ggg cat gtg cgc atg cct gca tac gtg		1064	
	Val Arg Asp Glu Tyr Val Ala Gly His Val Arg Met Pro Ala Tyr Val			
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	cgc ggc aag caa ggc gta gtg ctg cac cgg acc act gaa cag tgg ccg Arg Gly Lys Gln Gly Val Val Leu His Arg Thr Thr Glu Gln Trp Pro 345 350 355	1112
5	ttt ccg gac gcg att ggc cat ggc gac cag agc gct gcg cat caa ccg Phe Pro Asp Ala Ile Gly His Gly Asp Gln Ser Ala Ala His Gln Pro 360 365 370	1160
10	acc tac cat gtc gag ttc cgc gtg cgg gac ctg tgg ggc gat gcc gca Thr Tyr His Val Glu Phe Arg Val Arg Asp Leu Trp Gly Asp Ala Ala 375 380 385	1208
15	gac gac ggc ctg gtg gta gac ctg ttc gaa agc tat ctg gac agg Asp Asp Gly Leu Val Val Val Asp Leu Phe Glu Ser Tyr Leu Asp Arg 390 395 400	1256
20	gtc gaa agc ccg cga gtg gtg cgc gca tga gtgccggcgc ccaggcaggc Val Glu Ser Pro Arg Val Val Arg Ala 405 410	1306
25	cggctgccgg tgacggtcct ttcaaggcttc ctcggcgcag gcaagaccac cctgctcaac cacatcctgc gcaaccgcca gggcctgaag gtggcggtta tcgtcaatga catgagc gag 420	1366
30	gtcaacatcg atgcccggca ggtccagcgc gacgttgcgc tgtatcgtgg ccaggatgaa ttgatagaga tgagcaacgg ctgtatctgc tgcaccctgc gcgcgcacct gcttgagc gag 445	1426
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45	ccgctggccg atctgctgat cgagcaggc gagtatgcca atgtgattct ggtcaacaaa cgcgacctgg tcgacgaggc gcagtaccag gccctgcagg cagttctcgc cgggctcaat 520	1606
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Val Leu Lys Arg Lys Asp Leu Ile Pro Glu Gly Tyr Ile Glu Gln Leu
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Thr Gln Leu Met Glu His Gly Trp Ser Pro Glu Asn Gly Ala Arg Ile
35 40 45

15

Val Ala Lys Ala Trp Val Asp Pro Gln Phe Arg Glu Leu Leu Lys
50 55 60

20

Asp Gly Thr Ala Ala Cys Ala Gln Phe Gly Phe Thr Gly Pro Gln Gly
65 70 75 80

25

Glu Tyr Ile Val Ala Leu Glu Asp Thr Pro Gln Leu Lys Asn Val Ile
85 90 95

25

Val Cys Ser Leu Cys Ser Cys Thr Asn Trp Pro Val Leu Gly Leu Pro
100 105 110

30

Pro Glu Trp Tyr Lys Gly Phe Glu Phe Arg Ala Arg Leu Val Arg Glu
115 120 125

35

Gly Arg Thr Val Leu Arg Glu Leu Gly Thr Glu Leu Pro Gly Asp Met
130 135 140

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Val Val Lys Val Trp Asp Thr Ser Ala Glu Ser Arg Tyr Leu Val Leu
145 150 155 160

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Pro Gln Arg Pro Ala Gly Ser Glu His Met Ser Glu Glu Gln Leu Arg
165 170 175

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Gln Leu Val Thr Lys Asp Val Leu Ile Gly Val Ala Leu Pro Arg Val
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10 Trp Glu His Leu Ala Tyr Ser Leu Met Phe Ile Gly Val Asp His Leu
35 40 45

15 Asn Lys Phe Ser Val Asp Glu Ile Arg His Ala Val Glu Arg Ile Asp
50 55 60

20 Val Arg Gln His Val Gly Thr Glu Tyr Tyr Glu Arg Tyr Val Ile Ala
65 70 75 80

25 Thr Ala Thr Leu Leu Val Glu Thr Gly Val Ile Thr Gln Ala Glu Leu
85 90 95

30 Asp Glu Ala Leu Gly Ser His Phe Lys Leu Ala Asn Pro Ala His Ala
100 105 110

35 Gln Gly Arg Ala Ala Ile Ile Gly Arg Ala Pro Phe Glu Val Gly Asp
115 120 125

40 Arg Val Ile Val Arg Asp Glu Tyr Val Ala Gly His Val Arg Met Pro
130 135 140

45 Ala Tyr Val Arg Gly Lys Gln Gly Val Val Leu His Arg Thr Thr Glu
145 150 155 160

50 Gln Trp Pro Phe Pro Asp Ala Ile Gly His Gly Asp Gln Ser Ala Ala
165 170 175

55 His Gln Pro Thr Tyr His Val Glu Phe Arg Val Arg Asp Leu Trp Gly
180 185 190

60 Asp Ala Ala Asp Asp Gly Leu Val Val Asp Leu Phe Glu Ser Tyr
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Leu Asp Arg Val Glu Ser Pro Arg Val Val Arg Ala
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15	aac cgc cag ggc ctg aag gtg gcg gtt atc gtc aat gac atg agc gag Asn Arg Gln Gly Leu Lys Val Ala Val Ile Val Asn Asp Met Ser Glu 35 40 45	144
20	gtc aac atc gat gcc gcc cag gtc cag cgc gac gtt gcg ctg tat cgt Val Asn Ile Asp Ala Ala Gln Val Gln Arg Asp Val Ala Leu Tyr Arg 50 55 60	192
25	ggc cag gat gaa ttg ata gag atg agc aac ggc tgt atc tgc tgc acc Gly Gln Asp Glu Leu Ile Glu Met Ser Asn Gly Cys Ile Cys Cys Thr 65 70 75 80	240
30	ctg cgc gcc gac ctg ctt gag cag atc agc gcg ctg gcg cgc cag cag Leu Arg Ala Asp Leu Leu Glu Gln Ile Ser Ala Leu Ala Arg Gln Gln 85 90 95	288
35	cgt ttc gat tac ctg ttg atc gag tcc acc ggg att tcc gag ccg atg Arg Phe Asp Tyr Leu Leu Ile Glu Ser Thr Gly Ile Ser Glu Pro Met 100 105 110	336
40	cca gtc gcc gag acc ttt gcc ttt ctc gac gcc aac ggt ttc agc ctc Pro Val Ala Glu Thr Phe Ala Phe Leu Asp Ala Asn Gly Phe Ser Leu 115 120 125	384
45	agc gaa ctg gcg cgg ctg gat acg ctg gtg acg gtg gtc gat gcc agc Ser Glu Leu Ala Arg Leu Asp Thr Leu Val Thr Val Val Asp Ala Ser 130 135 140	432
50	cag ttc atg gcc atg ctc gac tct ccc gaa acc gtc gcg cgg gcc gac Gln Phe Met Ala Met Leu Asp Ser Pro Glu Thr Val Ala Arg Ala Asp 145 150 155 160	480
55	gtc acc acg gat gac agc agg cgc ccg ctg gcc gat ctg ctg atc gag Val Thr Thr Asp Asp Ser Arg Arg Pro Leu Ala Asp Leu Leu Ile Glu 165 170 175	528
60	cag gtc gag tat gcc aat gtg att ctg gtc aac aaa cgc gac ctg gtc Gln Val Glu Tyr Ala Asn Val Ile Leu Val Asn Lys Arg Asp Leu Val 180 185 190	576
65	gac gag gcg cag tac cag gcc ctg cag gca gtt ctc gcc ggg ctc aat Asp Glu Ala Gln Tyr Gln Ala Leu Gln Ala Val Leu Ala Gly Leu Asn 195 200 205	624
70	cca ggc gca cag atc ctg ccg atg gtg gcc ggc aac gtc gcc ctg tcg Pro Gly Ala Gln Ile Leu Pro Met Val Ala Gly Asn Val Ala Leu Ser 210 215 220	672

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	225 230 235 240	
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	245 250 255	
10	tcg cag acc tat ggc gtg acg tca tgg gtg tac cga gcg cgc gcc ccg Ser Gln Thr Tyr Gly Val Thr Ser Trp Val Tyr Arg Ala Arg Ala Pro	816
	260 265 270	
15	tcc cat ccg caa cgc ttg ctt gat ttt ctc gcc cgg ccc tgg cgc gac Phe His Pro Gln Arg Leu Leu Asp Phe Leu Ala Arg Pro Trp Arg Asp	864
	275 280 285	
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20	290 295 300	
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	305 310 315 320	
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	325 330 335	
30	gac aag tat cgc ttg cag ggc atc atg gcc aag tgg gac agc atc gtc Asp Lys Tyr Arg Leu Gln Gly Ile Met Ala Lys Trp Asp Ser Ile Val	1056
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	Asn Arg Gln Gly Leu Lys Val Ala Val Ile Val Asn Asp Met Ser Glu 35 40 45	
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	Val Asn Ile Asp Ala Ala Gln Val Gln Arg Asp Val Ala Leu Tyr Arg 50 55 60	
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Leu Arg Ala Asp Leu Leu Glu Gln Ile Ser Ala Leu Ala Arg Gln Gln.
85 90 95

5 Arg Phe Asp Tyr Leu Leu Ile Glu Ser Thr Gly Ile Ser Glu Pro Met
100 105 110

10 Pro Val Ala Glu Thr Phe Ala Phe Leu Asp Ala Asn Gly Phe Ser Leu
115 120 125

15 Ser Glu Leu Ala Arg Leu Asp Thr Leu Val Thr Val Val Asp Ala Ser
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Gln Phe Met Ala Met Leu Asp Ser Pro Glu Thr Val Ala Arg Ala Asp
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20 Val Thr Thr Asp Asp Ser Arg Arg Pro Leu Ala Asp Leu Leu Ile Glu
165 170 175

25 Gln Val Glu Tyr Ala Asn Val Ile Leu Val Asn Lys Arg Asp Leu Val
180 185 190

30 Asp Glu Ala Gln Tyr Gln Ala Leu Gln Ala Val Leu Ala Gly Leu Asn
195 200 205

35 Pro Gly Ala Gln Ile Leu Pro Met Val Ala Gly Asn Val Ala Leu Ser
210 215 220

Ser Val Leu Gly Thr Gln Leu Phe Asp Leu Pro Ser Leu Ala Ala Ala
225 230 235 240

40 Pro Gly Trp Met Lys Gln Met Asp Ala His Asp Thr Pro Ala Gly Glu
245 250 255

45 Ser Gln Thr Tyr Gly Val Thr Ser Trp Val Tyr Arg Ala Arg Ala Pro
260 265 270

50 Phe His Pro Gln Arg Leu Leu Asp Phe Leu Ala Arg Pro Trp Arg Asp
275 280 285

55 Gly Arg Leu Leu Arg Ser Lys Gly Tyr Phe Trp Leu Ala Ser Arg His
290 295 300

60 Arg Glu Ile Gly Leu Leu Val His Ser Gly Gln Gln Phe Gln Trp Asp
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Tyr Val Gly His Trp Trp Asn Phe Ile Asp Thr Ser Gln Trp Pro Gln
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20 <210> 12
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25 <220>
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40 <220>
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50 <220>
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